

# Audibox™

## Precision Tools for Audio Professionals

A complete range of precision tools designed to perform essential professional audio functions in an ultra compact, flexible package.

'Little black boxes' for every audio toolbox!

Power options include Phantom Power as supplied from a mixing console, or 12V DC from any suitable external Power Supply. Multiple units can be powered from the Audibox High Density DC Power Supply.

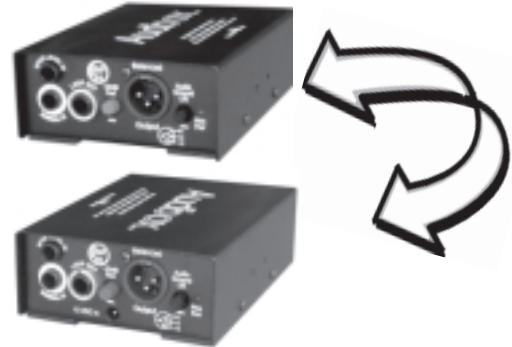


# About the Audibox range

- Available in standard Single channel or our unique DoubleHeader format where applicable. Need another channel? Simply turn the unit around!
- 12 V DC Power option
- Phantom Power option for applicable products
- Superb 'High Density' precision design provides stunning audio quality
- Security options include Kensington-type computer keylock slot, plus bracket kit for under-table mounting
- Audibox multi-unit power supply available
- Rack Mount kit available for multiple units

Our unique optional 'DoubleHeader' format gives you twice the processing power in the same compact format!

Channel 1 - turn the unit around...



...and Channel 2 is on the other end!

## Compact Design

The compact size of the Audibox series means that four units can be mounted side by side in a 1RU rack mount tray. With totally passive devices like the ISO-Later and the ISO Splitter, four units can be rack mounted. In the case of externally powered units, then 3 units and the Audibox PSU can be racked. There is provision in the PSU to supply DC to a further 3 units which could be mounted in a second rack.

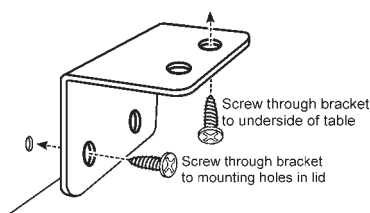


RMK-1 Rack Mounting Kit

## Out-of-Sight Mounting

A steel mounting bracket kit is available to attach individual Audibox units to out-of-sight surfaces, eg. underneath desk or table. The kit contains self tapping screws to mount the brackets to the sides of the unit, and also to the table, desk or bench.

1 bracket per side, 4 screws per side (extra screws omitted from diagram for clarity)

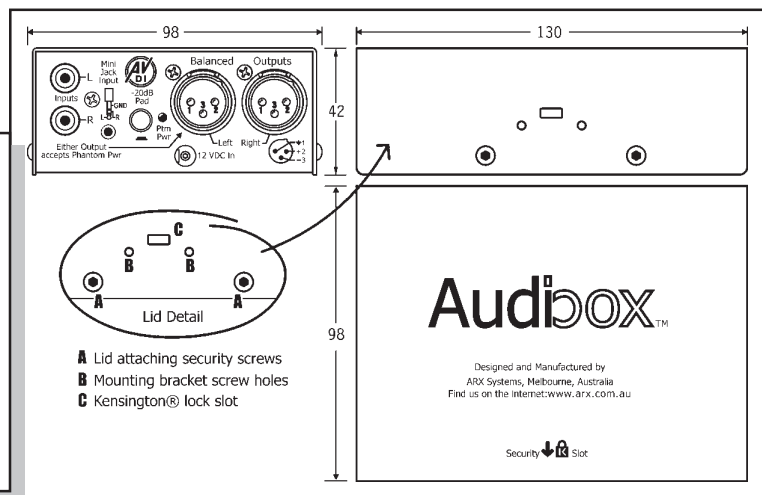


TMK-1 Table Mounting Kit

## Precision engineering

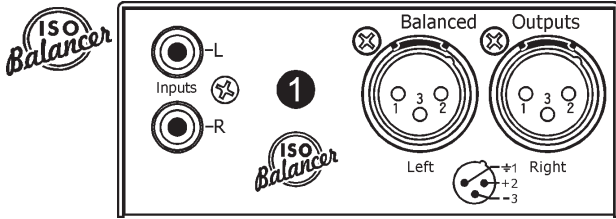
The Audibox range share a common footprint and manufacturing platform. Offset lid screws enable close side-by-side mounting of multiple units.

Each unit's dimensions are 98mm W x 130mm D x 42mm H. Allowance should be made for at least 50mm clearance at the front to allow for connectors, and the same at the rear if it is a DoubleHeader dual channel unit.

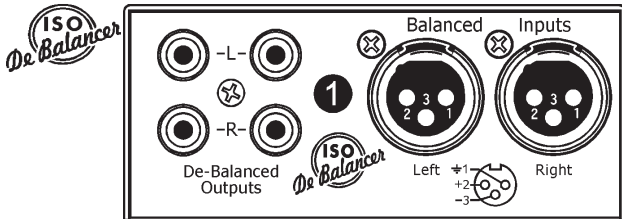


All models in the Audibox range feature the same heavy duty all-steel chassis finished in attractive matt textured powdercoat, with hardwearing epoxy screen printing and large slip resistant rubber foot pads. By their very nature these units are compact and port-

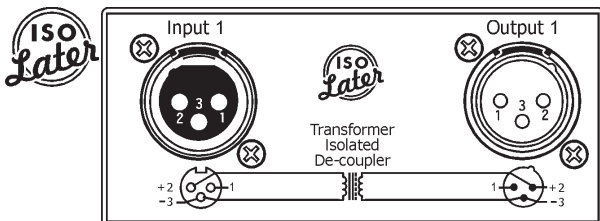
able; to protect your investment we've added numerous security features including a slot for computer lock, and the option of a permanent table mounting kit. A rack mount kit is also available to rack up to 3 units plus power supply in 1 RU



Dual channel Unbalanced to Balanced Low Impedance transformer isolated converter  
Available in Dual Channel format only

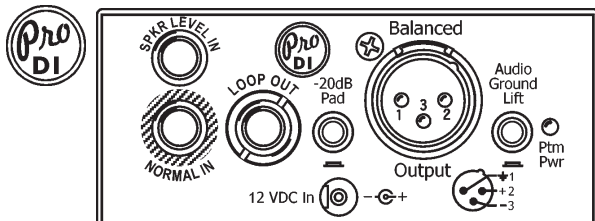


Dual channel Unbalanced to Balanced Low Impedance transformer isolated converter  
Available in Dual Channel format only



A transformer isolated de-coupler, for removing Ground loops and for use in applications where complete Galvanic isolation is required.

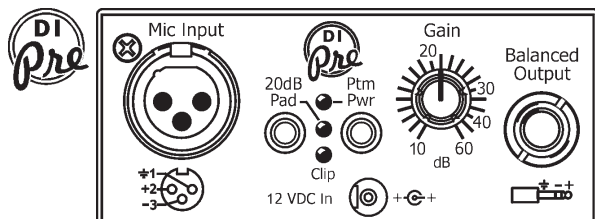
Available in Single Channel or Double Header format



Ultra compact Active Direct box, with normal High Impedance input as well as a separate speaker level input for connection to instrument amplifiers.

Other features include -20dB Pad and Audio Ground Lift switches, plus Phantom or 12V DC power options.

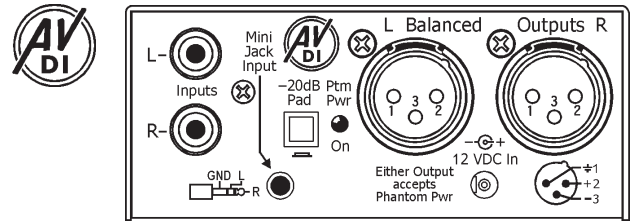
Available in Single Channel or Double Header format



Ultra compact Microphone Pre amp with XLR input, balanced jack output and 10 to 60dB Gain control.

Other features include -20dB Pad switch, Clip LED and Phantom Power switch, plus 12V DC power connector.

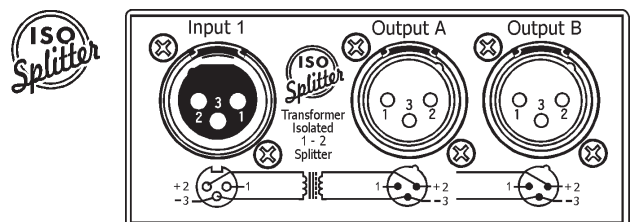
Available in Single Channel or Double Header format



Stereo AudioVisual Active Direct box, with dual RCA or stereo mini jack input and dual XLR outputs. Ideal for interfacing consumer audio (especially computer sound cards) with professional systems.

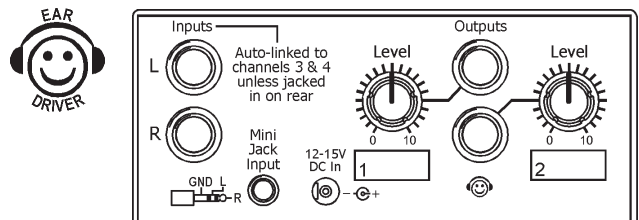
Other features include full-time soft audio ground, -20dB Pad, plus Phantom or 12V DC power options.

Available in Dual Channel format only



A transformer isolated 1 input to 2 outputs splitter for splitting 1 input 2 ways in applications where complete Galvanic isolation is required.

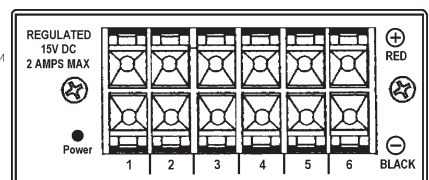
Available in Single Channel or Double Header format



Stereo inputs feed two channels of headphone level outputs. Individual Level controls plus 12V DC power connector.

Available in Double Header format only; Channels 1 and 2 are AutoLinked into Channels 3 and 4 unless other inputs are jacked into 3 and 4. A compact, flexible unit

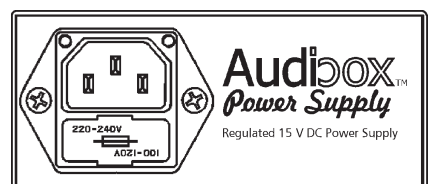
## Audibox Power Supply



Regulated 15 volt DC Power Supply, ideally suited to the Audibox system.

110/120 or 220/240 V AC in, and six individual 15V DC outputs, with external AC fuse.

Rack mount kit available to rack up to 3 units plus power supply, or 4 individual units, in 1 RU



# Audibox Preliminary Specifications

## DI Pro; DI Pro 2

<b>Max Input Level</b>	+12 dB Phantom powered, +8 dB using 12 VDC Power Supply.
<b>Input Impedance</b>	1 Meg Ohm
<b>Max Output Level</b>	(nominal) +12 dB 10K Ohm load using Phantom power +11 dB 600 Ohm load using 12 VDC Power Supply
<b>Output Impedance</b>	680 Ohms Balanced
<b>Output Signal to Noise</b>	-100 dB unweighted, -104 dB A weighted
<b>Dynamic Range</b>	112 dB 10K Ohm load using 12 VDC Power Supply
<b>Distortion</b>	100 Hz 0.0025%, 1KHz 0.0026%, 10KHz 0.0033%
<b>Frequency Response</b>	20Hz to 20KHz, $\pm 0.2$ dB
<b>Gain through Unit</b>	6dB (Normal input, Pad switch out)
<b>Pad Switch</b>	-20 dB attenuation
<b>Speaker Input</b>	
	-40 dB attenuation, equivalent to 100:1 decrease in input level. -60 dB attenuation available with Pad switch
<b>Input Connectors</b>	Insulated jacks
<b>Output Connector</b>	
	3 pin male XLR. Wired Pin 1 Ground, Pin 2 + Hot, Pin 3 - Cold. Audio Ground (Pin 1) lift switch fitted
<b>Construction</b>	All-steel powdercoated chassis, fibreglass PCB

## DI Pre; DI Pre 2

<b>Mic Input Impedance</b>	2 K Ohms Balanced
<b>Phantom Power Voltage</b>	Switchable +48 V DC on XLR Pins 2 and 3
<b>Input Gain</b>	+10 dB Minimum, variable to +60 dB Maximum
<b>Pad Switch</b>	-20 dB attenuation
<b>Overload Indicator</b>	Measured at all Gain points throughout the circuitry
<b>Output Noise</b>	-90 dB Unweighted, -97 dB 'A' weighted (Measured with Gain nominal 20 dB.)
<b>Frequency Response</b>	20 - 20 KHz $\pm 0.25$ dB
<b>Distortion</b>	100 Hz 0.0085%, 1 KHz 0.008%, 10 KHz 0.0083% (Measured with Mic Gain @ 20 dB)
<b>Input Connector</b>	Balanced 3 pin female XLR type Pin 1 Audio Ground, Pin 2 + Hot, Pin 3 - Cold
<b>Output Connector</b>	Insulated Tip Ring Sleeve balanced jack
<b>Construction</b>	All-steel powdercoated chassis, fibreglass PCB

## ISO Later; ISO Later 2

<b>Input Impedance</b>	600 Ohms
<b>Output Impedance</b>	600 Ohms
<b>Frequency Response</b>	20Hz - 20 KHz $\pm 0.1$ dB
<b>Maximum Output Level</b>	+ 24dBm
<b>THD at Max Output</b>	0.2% 30 Hz - 20KHz
<b>Insertion Loss</b>	0.75dB @ 1 KHz (600 Ohm source & load)
<b>Input Connector</b>	3 pin female XLR wired Pin 2 + Hot, Pin 3 - Cold
<b>Output Connector</b>	3 pin male XLR wired Pin 2 + Hot, Pin 3 - Cold. Audio grounds are unconnected
<b>Construction</b>	All-steel chassis, fibreglass PCB, ultra low noise audio transformer

## Ear Driver

<b>Inputs</b>	44 K Ohms Balanced, 22 K Ohms Unbalanced
<b>Stereo Headphone Output</b>	1 watt @ 8 ohms max.
<b>Frequency Response</b>	20 Hz - 20 KHz $\pm .5$ dB
<b>Distortion</b>	Max .1% prior to clipping.
<b>Input Connectors</b>	Insulated Left and Right jacks. Inserting 1/4" jack into Left Input only will mono all Outputs Channel A Inputs will loop through to all outputs unless Input jacks are inserted into Channels 3 and 4
<b>Output Connectors</b>	Insulated Tip-Ring-Sleeve jack. Wired Tip - Left out, Ring - Right out, Sleeve - Ground / Earth
<b>Construction</b>	All-steel powdercoated chassis, fibreglass PCB

## AV DI

<b>Input Impedance</b>	47K Ohms unbalanced, on both RCA connectors and Mini Jack
<b>Max Input Level</b>	Line +8 dB with Pad switch Out, + 28dB with Pad switch In
<b>Gain through Unit</b>	6dB, Pad switch Out.
<b>Output Noise</b>	-90 dB Unweighted, -97 dB 'A' weighted, inputs loaded
<b>Frequency Response</b>	20 - 20 KHz $\pm 0.3$ dB
<b>Input Connectors</b>	Left and Right RCA (phono) connectors, plus Tip-Ring-Sleeve Mini Jack
<b>Output Connectors</b>	Dual 3 pin XLR wired Pin 1 Ground, Pin 2 + Hot, Pin 3 - Cold.
<b>Construction</b>	All-steel powdercoated chassis, fibreglass PCB

## ISO Balancer 2

<b>Input Impedance</b>	10K Ohms Balanced
<b>Output Impedance</b>	10K Ohms Unbalanced
<b>Input Level (max)</b>	+12dB
<b>Frequency Response</b>	20Hz - 20 KHz $\pm 0.5$ dB
<b>THD at Max Output</b>	0.2% 0dB 1 KHz, 30 Hz - 20KHz
<b>Insertion Loss</b>	0.75dB @ 1 KHz (600 Ohm source)
<b>Output Connectors</b>	3 pin male XLR, wired Pin 1 Ground, Pin 2 + Hot, Pin 3 - Cold. Chassis Ground to XLR Pin 1
<b>Input Connectors</b>	Stereo RCA connectors
<b>Construction</b>	All-steel chassis, fibreglass PCB, ultra low noise audio transformer

## ISO De-Balancer 2

<b>Input Impedance</b>	10K Ohms Balanced
<b>Output Impedance</b>	10K Ohms Unbalanced
<b>Input Level (max)</b>	+12dB
<b>Frequency Response</b>	20Hz - 20 KHz $\pm 0.5$ dB
<b>THD at Max Output</b>	0.2% 30 Hz - 20KHz
<b>Insertion Loss</b>	0.75dB @ 1 KHz (600 Ohm source)
<b>Input Connector</b>	3 pin female XLR, wired Pin 1 Ground, Pin 2 + Hot, Pin 3 - Cold. Chassis Ground to XLR Pin 1
<b>Output Connectors</b>	Dual stereo RCA connectors
<b>Construction</b>	All-steel chassis, fibreglass PCB, ultra low noise audio transformer

## ISO Splitter; ISO Splitter 2

<b>Input Impedance</b>	300 Ohms
<b>Output Impedance</b>	2 secondaries @ 600 Ohms each
<b>Frequency Response</b>	20Hz - 20 KHz $\pm 0.1$ dB
<b>Maximum Output Level</b>	+ 20dBm
<b>THD at Max Output</b>	0.2% 30 Hz - 20KHz @ 20dBm
<b>Insertion Loss</b>	1.6dB @ 1 KHz (600 Ohm source & load)
<b>Input Connector</b>	3 pin female XLR wired Pin 2 + Hot, Pin 3 - Cold
<b>Output Connectors</b>	3 pin male XLR wired Pin 2 + Hot, Pin 3 - Cold. Audio grounds are unconnected
<b>Construction</b>	All-steel chassis, fibreglass PCB, ultra low noise audio transformer

## AB PSU Power Supply

<b>AC Input Connector</b>	Removable 3 pin IEC connector
<b>Input Voltage Selection</b>	110/120 V or 220/240 VAC, 50-60 Hz, Voltage externally variable
<b>AC Fuse</b>	External 500mA
<b>Output Voltage</b>	Fully Regulated 15V DC @ 2 amp maximum output. Short circuit protected, automatic reset.
<b>Output Connectors</b>	6 x + and - spring terminals
<b>Construction</b>	All-steel powdercoated chassis, fibreglass PCB

Latest updates available at: [www.arx.com.au/audibox.htm](http://www.arx.com.au/audibox.htm)

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Our policy is one of continuous improvement, and therefore designs may change without notice. However, unless otherwise stated, specifications will always equal or exceed those previously given.

